

## INTERNATIONAL SEARCH REPORT

International Application No

PCT/GB 03/04914

## A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 F16K11/10 F04D27/02 F16K11/044 F16K17/04

According to International Patent Classification (IPC) or to both national classification and IPC

## B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 F16K G05D F04D F02C F01D

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the International search (name of data base and, where practical, search terms used)

EPO-Internal

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	FR 2 158 688 A (MESSIER HISPANO SA) 15 June 1973 (1973-06-15)	1
Y	claim 1; figures	9
X	GB 995 535 A (HOERBIGER VENTILWERKE AG) 16 June 1965 (1965-06-16)	10
Y	page 2, line 66 -page 3, line 9; figure 1	9
X	US 4 674 526 A (ATHANASSIU CHRISTOS) 23 June 1987 (1987-06-23)	1
	claim 1; figures 2,3	
A	US 6 308 724 B1 (CABRERA MARIO D ET AL) 30 October 2001 (2001-10-30)	1,9,10
	column 7, line 14 - line 58; figure 2	

☐ Further documents are listed in the continuation of box C.☒ Patent family members are listed in annex.

## \* Special categories of cited documents:

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\*X\* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

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\*&amp;\* document member of the same patent family

Date of the actual completion of the international search

17 March 2004

Date of mailing of the international search report

24/03/2004

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# INTERNATIONAL SEARCH REPORT

Information on patent family members

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Patent document cited in search report		Publication date	Patent family member(s)	Publication date
FR 2158688	A	15-06-1973	FR 2158688 A5	15-06-1973
GB 995535	A	16-06-1965	AT 240122 B	10-05-1965
US 4674526	A	23-06-1987	NONE	
US 6308724	B1	30-10-2001	US 6105598 A	22-08-2000
			AU 5754901 A	20-11-2001
			BR 0106425 A	09-04-2002
			CA 2378167 A1	15-11-2001
			CN 1380904 T	20-11-2002
			EP 1287287 A2	05-03-2003
			WO 0186194 A2	15-11-2001